

Application No. 10/808,665  
Amendment Dated April 17, 2007  
Reply to Office Action of January 17, 2007

**REMARKS**

The above amendments are made in response to the first Office Action mailed on January 17, 2007, wherein:

1. Claims 17-26 and 37-45 are withdrawn in response to a previously issued Restriction Requirement;
2. Claim 27 and its dependent claims 28-36 were rejected under 35 U.S.C. §101 as being directed to non-statutory subject matter;
3. Claim 28 was objected to on the basis of unclear language;
4. Claims 1-16 were tentatively allowed; and
5. Claims 27-36 were indicated as being allowable if rewritten to overcome the rejection under 35 U.S.C. §101.

Applicants acknowledge with appreciation the Examiner's tentative allowance of Claims 1-16, and the indication that Claims 27-36 would be allowable if rewritten to overcome the Rejection under 35 U.S.C. §101 and the objection to Claim 28. With this Amendment, Claims 17-26 and 37-45 have been cancelled, and Claims 27 and 28 have been amended to overcome the rejection and objection. Also, Claims 30-34 have been amended to correct obvious typographical errors. The Undersigned respectfully thanks the Examiner for extending the courtesy of an interview on April 13, 2007, at which time possible amendments to Claim 27 were discussed. While the Undersigned and the Examiner did not come to agreement on the allowability of the possible amendments, the Undersigned found the Interview to be productive in formulating an amendment to Claim 27. **In summary, Claims 1-16 and 27-36 are pending in the application.**

**Amendment to Claim 27.**

Claim 27 has been amended to further clarify that a tangible result is provided. Specifically, the last step of the claim has been amended to recite "outputting a signal representative of an estimated value for the refractive index of the substance," where the estimated value is "generated from the measured beam width and a relationship between

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refractive index and beam width." Applicants respectfully submit that the estimated value, the signal representative thereof, and the outputting step are tangible results. The amendment to Claim 27 is supported, *inter alia*, by paragraph [0045] of the original Specification and FIG. 6, which disclose and show a controller 60 that computes a refractive index based on measured beam width and relationship 40, and further disclose and show signal lines coupled between controller 60 and user interface device, such as a keyboard and computer terminal. The latter, of course, are for presenting the refractive index to a user, according to the broad objectives of the present invention. The Undersigned respectfully submits that the amendments to Claim 27 do not enter new matter. The Undersigned also respectfully submits that amended Claim 27 meets the requirements of 35 U.S.C. §101 and is allowable thereover.

**Amendments to the Specification.**

Amendments to the Specification have been made to correct obvious typographical errors, and to provide more clarity of reading in spots. The Undersigned respectfully submits that no new matter has been entered by these amendments.

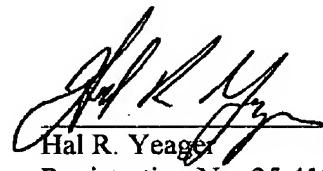
**CONCLUSION**

In view of the amendments and remarks made above, the Undersigned respectfully submits that the application is in condition for allowance and action to that end is respectfully solicited. If the Examiner should feel that a telephone interview would be productive in resolving issues in the case, she is invited to telephone the Undersigned at the number listed below.

April 17, 2007

Respectfully submitted,

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